

## THE MICROSCOPE IN THE SCHOOLROOM.

My experience of a microscope in the schoolroom is that it is a constant joy.

Of course, we use it in the Natural History lessons, especially this term when insects have been studied.

Then on our walks we are always on the look-out for anything which will "look well under the microscope."

A plan which I have found to answer very well is to issue tickets to admit to a lecture illustrated by the microscope. The bearer must bring with him various objects which he would like to see magnified. All these are put on the table, and the lecturer chooses out those specimens which she thinks will teach most in a short time. The audience come up in turn, and see the object under a fairly low power.

It is just as well not to allow the children to work too long at it, as it is apt to try the eyes if they are not very strong.

Another good plan is to take various objects each week, and as many specimens as possible should be collected for examination during the walks in that week: *e.g.*, one week it might be fungi, the next lichens, the next various hairs, the next water wonders, and so on. Of course one must go out provided with pill-boxes and small bottles.

Then on a wet afternoon there are several suitable objects to be found in the schoolroom alone, *e.g.*, blotting-paper, various materials, human hair, wood, &c.

I have about seventy slides, but usually reserve these as a special Sunday treat.

I have found that older pupils enjoy making fresh slides with me, but this is naturally too difficult for the little ones.

Dr. Lankester's little book, "Half-hours with the Microscope" (published by Gibbings & Co., price 2/6) has proved

most useful. There are chapters devoted respectively to a half-hour with the microscope in the garden, in the country, at the pond side, at the sea side, and indoors, as well as others on the structure of the microscope, polarized light, and the mounting of objects.

Of course, the great difficulty about having a microscope is that it is expensive; but after the first outlay there is little, if any, further cost.

C. M. B.

## FAIRY TALES.

Up the airy mountain,  
Down the rushing glen,  
We daren't go a-hunting  
For fear of little men!

How many of us would give something to regain that lost delicious thrill of terror, that awesome respect, for the unseen "little people!" The youth of the individual repeats in a great measure the youth of the world. When "all the world was young, lad," and men had not exploited one tithe of the possible, the achievement of the hitherto impossible was part of their daily experience—part of the food on which a race of heroes was bred. The deeds of a hero are always magnified after death, and his fame steps by gradual degrees over the limits of narration, and finally soars altogether on the wings of fancy. We have one or two instances in which the authentic history and the consequent "fairy" tale have both been preserved. For instance, Charlemagne's paladin "Roland" was an undaunted warrior, but he has become a legendary upholder of all justice and a legendary winner of all victories at any sufficiently remote date—"I am Roland, I am Roland, there is victory in the land." Then to the tale were added marvellous swords, a magic horn and the blasted rock in the Pyrenees, and all the "personnel" of a true



"fairy" story. Now when we once begin to analyse and compare fairy stories we find two remarkable facts at once claiming our attention. Firstly, almost every European country, and many another scattered race of Ayran, or even non-Ayran origin, has some version or other of two or three fairy tales as a common folk-lore. Cinderella, Puss in Boots, Jack and the Bean-stalk are, under different names, almost the common heritage of the world's children. Secondly, all the common heritage of the world's children. Secondly, all the "fairy stories" group themselves naturally under two headings, heroic "sago" and animistic totemistic "animal tales."

The first fact deserves real and serious study, which the modern interest in research, and the attention now given to folk-lore, seem to show it may get at last. Whether or no we hold that the repositories of these stories—namely, the different races—had a common origin, it is surely more than likely that the tales themselves had! They celebrated some hero, or some natural fact, and were, in their origin, true to nature! Perseus and St. George are only two renderings of a common tale; but who knows whether in the distant past some half-savage Greek did *not* rescue some poor damsel from an ichthyosaurus or other neolithic beastie! There is a curious likeness in old descriptions and Chinese representations of dragons to creatures whose bones lie in our museums, and whose "elevations" are freely made by our scientists—and how are we to say that some did not linger in caves and holes of the rocks until the historical era? Then the "myths," which relate to natural facts, are, of course, in that sense, universally true. Adonis, Tammuz and Baldur are one and the same—representatives of beloved, short-lived summer. Demeter and Proserpine are eternal types of spring and autumn. Then observe how in another class of story the hero is the mortal who outwits "The Little Folk," and it is he, and not they, who represents courage, success, and valour. The history of the dim past, as it is partially revealed, is explaining all this for us. As one by one the Ayran races pursued their conquering way they found in possession of the land little people—Basques, Lapps, Finns, Ibernians—who had to be dispossessed; but who lingered, tricky, furtive and cunning, in the depths of the forests, precisely as do the Congo Pigmies to this day; so that class of story, many of which are so well known to

the Irish peasant, is easily explained, and found to have, like all the others, a fundamentally true origin.

The Animal Tales are based partly on totem worship and partly on the naturally close observations of a nomadic hunting people. There is a German epic about "Reynard," written centuries before "Uncle Remas," which told us of "Brer Fox and Brer Rabbit"—the one version is Teutonic and the other Hamitic; yet, curiously enough, the animals are true to nature on the whole, though it is always the fox who gets the worst of it!

So it is in the ancient fairy stories that we find the psychology and social history of past ages; their very embroidery of wonders is only a witness to man's early credulity and unbounded hopes. Of course in times which had only left the "stone age" and the "bronze age" behind as a baby leaves its long clothes, "swords" of steel were necessarily magical. Of course in an age which relied on the clairvoyancy of oracles, Alurna Wives and Druids for its spiritual direction, fairy god-mothers and god-fathers were as much matters of course as the "household chaplain" or Monsieur L'Abbé of a later literature. Eastern tales such as the "Arabian Nights," &c., show precisely the same mingling of ill-digested knowledge, original fact, and added romance. The voyages of Sinbad the Sailor, for instance, are not so entirely fabulous after all—roc's eggs are in more than one museum now. The Indian, used to the inexplicable jugglings of the fakirs which not even the most sceptical modern European can always explain, put no limits to the actions which may be attributed to any man—as the tales which have grown around the historical Buddha testify.

So, then, we claim for ancient fairy stories that they embody truths as precious as those in Tacitus or the Anglo-Saxon Chronicle. They are a part of the modern child's heritage, as the heir of all ages and of all countries; and woe betide the narrow-minded Pharisee who would keep him from them, saying, they are all "moonshine and nonsense!" It is not merely imagination (or the power of self-transportation into sympathy with other times, other climes, other creatures) which they give, but they turn their eyes from childhood and its limited doings, and give them life stripped of subterfuges. It is not for nothing that your proper old-



fashioned fairy story begins with a birth, and goes through wars and tribulations on to "they married and lived happily ever after." Neither is it a fair criticism to say that they stop just where the real story begins. Take for example "Rumpelstiltskin," a tragedy of the woman who desires children at any cost, and has to be saved by her relations from herself! Now such stories could not be told to children as happening to the men and women of to-day—it would at once make them far too conscious and self-conscious—but let them be "strange stories of the death of kings" who have long been dust, and they reap the experience without any disillusionment, but with all the added illusions of their own gorgeous fancy. Sometimes the old tales prove so convincing, so realistic, that the child "believes in" fairies. Well, the conviction of the presence of unseen good or evil influences will do no harm when openly acknowledged and wisely treated. Man's anthropometric spirit delights to people the foxglove with bell-ringers, and to see in the fairy rings ballrooms for the "little folk;" and it is easy to make a real fairy out of Mr. Worker Bee, or "the legions of the fungi."

But when we turn to the modern supply of fairy stories there is room for sadness and misgivings. The old sanscrit tales live on immortal. Grimm and Andrew Lang's invaluable series of Red, Grey, Violet, &c., Fairy Books, make our children familiar with the old tales. Moreover, it is a good sign that the origins from which they sprang, and the heroic tales of old, are now often to be had; and it is possible to give our children Malory's *Morte d'Arthur*, Froissart's *Chronicles*, and Spenser's *Fairy Queen*, in forms which they can enjoy. Then, too, we have added a few figures to the gallery; "Alice in Wonderland" and "Mowgli" are true types of wondering girlhood and daring boyhood, and because true they are immortal.

But, oh! perish the thought of those "Tales for Tea Time," "Friends and Foes from Fairy Land," and the like, which we used to read in our childhood! Crude morality which punished the greedy boy and rewarded the good girl, lengthy descriptions of clothes and food, and maddening repetition of inferior rhymes! They were popular for the time, just as "Detective Stories" are popular—for a time—

but they only last in the vulgarizing effect they have on children's minds—savage old tales make no one vulgar, they are too simple.

Then arose another school, full of beautiful thoughts expressed in beautiful language—such writers as Hans Andersen and Mrs. Gatty—but parables are not fairy stories. Tell them how you will they are ethics, and not life, and it is not until we have done a little living on our own account that we can understand or enjoy moralization round it. Therefore, while the grown man and woman reads with joyful appreciation, the child is possibly bored and certainly puzzled.

The most modern purveyors of fairy stories have erred in two opposite directions. Pick up any number of the "Strand Magazine" and you will find in it a "fairy story;" this will be either a slavish imitation of the good old tale full of royalty, magic, and stray beasts, or the very latest story about children—true to Nature in a sort of dissecting child-study way, and made as likely as possible, though a wild strain of grandly impossible magic is introduced.

Of course we all enjoy "Five Children and It," and like to laugh over them; but is it good for the children? Such stories are far more likely to turn their eyes back upon themselves and their own lives, and to make them discontented with sane, everyday life, than the most immoral old tale of beautiful princesses and turbulent princes.

On the side of "Animism" we have some beautiful modern books—"The Lives of the Hunted," &c., but they are a little apt to be morbidly pitiful: "Kill or be killed" is the law of the Jungle, and study of the "Jungle Law" plus Nature study may yet give us in the future tales worthy to rank with the old epics of the beasts and their modern developments—those inimitable "Just So" Stories. These again ought to become classics, because they are true with the only real truth of character. "The cat who walked by himself" is photographed straight from life; so is the "Camelious Hump" which sometimes grows on human shoulders.

Children then should have all the spoils of the old world ransacked for them. Let them have the Greek Myths, the Roman Legends, the Norse Sagas and "Eddas," the French



"Romants," the Monkish Histories, and the Eastern religions and their founders as "fairy" stories. Tell them that all such are essentially veracious in fact, and essentially fanciful in detail. But never let them have tastes and powers of discrimination vitiated by endless tales, popular because they pander to undeveloped taste, consistent in detail and revelling in upholstery, but in spirit—pot-boilers written at so much per thousand words.

Grown men and women must choose for the little ones the real fairy stories—they have known magic, black or white, and should respect it.

So we ourselves turn the pages of life with half a sigh and half a smile, and settle down again to read the for-ever true and deathless story:—"Once upon a time there lived a King and a Queen who had an only son. . . . Now Prince Charming had a powerful fairy god-mother who was known as 'Bonne Chance,' and she led him to the common where sat the Princess in disguise tending her geese . . . . and so they married and lived happily ever after."

We fill in the blanks for ourselves with or without the aid of the good fairy "Bonne Chance." And for those who do not marry or live happily ever afterwards the highest and truest rôle in the fairy store awaits—it is for them to become the fairy god-mothers and god-fathers, and keep the old traditions of ever-ready, ever-willing service ever new, and make other's lives, if not their own, "a veritable fairy story."

R. A. P.

## MISSIONARY WORK.

I do not think any letter on the above subject has appeared in our Magazine before, but is it not one of which children should be taught in some measure to realise the duty and the privilege?

We tell them about the various peoples of the world, their customs, habits, dress, &c.; and should they not also be told of what is being done by some of the greatest heroes and heroines of our time in striving to lift many of these heathen out of ignorance and sin into civilization and the possibility of a truly Christian life. That children may be interested in the subject, and that keenly, I, for one, know, having tried it many times, and it is instructive from every point of view; it enlarges one's borders, increases one's knowledge of geography and history, and enables one to realise the diversity of men and things.

Is it not also a great antidote to selfishness teaching that "it is more blessed to give than to receive," and helping even children to realise the solemnity and obligation of our Lord's last command to His Church.

It will be found by practical experience that the benefits children are induced to promote on behalf of others reflect also on themselves; and whether rich or poor when they become interested by hearing they next want to do something.

There are many ways open to them:

- (1) Having a missionary box.
- (2) Making things for sale at home.
- (3) Making things to send abroad, such as prizes or Christmas gifts for native children.

Anyone reading for the first time of the delight in some of the schools—in India or in the Arctic Zone for example—when prizes sent out from England are distributed, cannot fail to be touched by it. I know, of course, that those who